

REMARKS

This paper is filed in response to the final official action dated November 13, 2008 (hereafter, the "official action"). This paper is timely filed.

Claims 1, 4-13, and 15-29 are pending in this application. By the foregoing, claims 1 and 13 have been amended and claims 6, 17, and 28 have been canceled without prejudice or disclaimer. More specifically, claim 1 has been amended to recite the subject matter of dependent claims 6 and 28; and claim 13 has been amended to recite the subject matter of dependent claim 17. Claims 7-9, 18, and 29 have been amended to change their dependencies. No new matter has been added.

CLAIM REJECTIONS – 35 U.S.C. §§ 102(b) & 103(a)

Claims 1, 4, 5, 10-11, 13, 15-16, 19-20, 22, and 26-27 have been rejected as anticipated by Sakamoto, U.S. Patent 5,594,463. Claims 6, 7, 12, 17, 18, 25, 28, and 29 have been rejected as obvious over Sakamoto in view of Everitt, U.S. Patent Publication 2002/0167471. Claim 8 has been rejected as obvious over Sakamoto in view of Everitt and in view of Koyama, U.S. Patent 6,730,966. Claim 24 has been rejected as obvious over Sakamoto and in view of Koyama. Claim 9 has been rejected as obvious over Sakamoto in view of Everitt and in view of Young et al., U.S. Patent 5,075,596. Claim 23 has been rejected as obvious over Sakamoto in view of Young et al. Claim 21 has been rejected as obvious over Sakamoto in view of Rutherford, U.S. Patent 6,861,810. The art-based rejections are respectfully traversed.

The examiner indicated that Sakamoto anticipated the subject matter of claims 1, 4, 5, 10, 11, 13, 15, 16, 19, 20, 22, 26, and 27. The examiner indicated that claims 6 and 28 were obvious over Sakamoto in view of Everitt, with Sakamoto teaching all of the claimed recitations except a display driver control circuit having a drive voltage sensor, which Everitt was purported to teach. The examiner's finding is respectfully contested as applied to amended claim 1 (corresponding to prior dependent claim 28, intervening claim 6 and claim 1) and amended claim 13 (corresponding to dependent claim 17).

Regarding claim 28, the Examiner asserts that Sakamoto discloses a maximum voltage detect module (see, page 9 of the Office Action). Specifically, the examiner refers to the sample/hold circuit 74 shown in figure 5, and to the description at column 6 lines 16 – 21,

which mentions that this circuit receives a signal from a terminal A. (Terminal A can be seen in figure 6 and is apparently connected to one of the drive lines of the display).

The applicant, however, disagrees that the sample/hold circuit of Sakamoto acts as a maximum voltage detect module, as claimed. The cited descriptions in Sakamoto certainly do not describe such operation. Furthermore, comparing figure 5 of Sakamoto with the example sample/hold circuit of figure 8 of the instant application shows that Sakamoto could not be said to provide a sample/hold circuit that detects maximum voltage of the drive line sensed voltages.

In figure 8 of the instant application, for example, there is a set of diodes 800 coupled to the sample/hold circuit 805, which selects a maximum voltage of the column electrode lines. Sakamoto, in contrast, is connected to a single terminal A, not a set of diodes and column lines. Therefore, Sakamoto would not perform a maximum detect function, as recited. Instead, as the examiner will appreciate, the sample/hold circuit shown in Sakamoto is simply a straightforward way to hold an analog voltage input to multiplexer 70 prior to analog/digital conversion by an A/D 72. Such a procedure would be recognized as standard practice – to provide a sample/hold circuit before an analog/digital conversion. In this way, the sample/hold circuit of Sakamoto is merely a conventional circuit and, it is respectfully submitted, is not and does not function as a maximum voltage detect module, as recited in claim 1.

These differences between Sakamoto's sample/hold circuit and the claimed maximum voltage detect module can be further appreciated, in that the sample/hold circuit 74 is coupled only to terminal A (shown in figure 6), whereas to operate as a maximum voltage detect module it would need to be connected to each of the drive lines of the display 30 shown in figure 6 – this is not the case. Thus, not only does the sample/hold circuit fail to teach the recited maximum voltage detect module, there would be no suggestion or teaching to modify Sakamoto to have such a module.

Everitt is the other reference cited in rejecting previous claim 28 (now claim 1). But that reference is cited for different teachings and either way does not teach a maximum voltage detect module as currently recited. In fact, none of the other art of record provides such a teaching.

Simply put, neither Sakamoto nor Everitt nor any other combination of the art of record can be described as teaching or suggesting a display driver control circuit having “a maximum voltage detect module to detect a maximum voltage of said drive line sensed voltages,” as recited in claim 1.

It is therefore respectfully submitted that: 1) the sample/hold circuit 74 shown in Sakamoto is not a maximum voltage detect module as claimed; and that 2) this circuit does not detect the maximum voltage of the drive line sensed voltages (the plural referring to the voltages on the plurality of drive lines referred to). Claim 1 and the claims depending therefrom are in condition for allowance.

With respect to remaining independent claim, method claim 13, applicant has amended that claim above to recite the subject matter of claim 17 and the additional phrase “wherein a maximum voltage detect module is used to detect said maximum sensed voltage of said drive line sensed voltages.” For similar reasons to those outlined above with respect to claim 1, applicant respectfully asserts that claim 13 and the claims depending therefrom are in condition for allowance.

THE AMENDMENT AFTER FINAL SHOULD BE ENTERED

It is believed that no new issues are raised by this response since the examiner is merely reconsidering claims which have already been considered (claims 1, 6 and 28), and an independent method claim corresponding to these. Therefore, the examiner is requested to enter the amendments after final and reconsider the entire claims in light thereof.

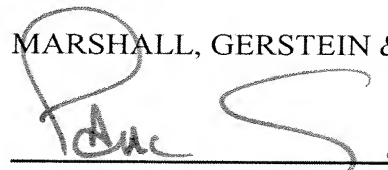
CONCLUSION

It is respectfully submitted that this application is now in condition for allowance. Should the examiner wish to discuss the foregoing, or any matter of form or procedure in an effort to advance this application to allowance, he is respectfully invited to contact the undersigned attorney at the indicated telephone number.

Respectfully submitted,

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